



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/759,677	01/18/2004	Steven A. Gronemeyer	ST00001C1 (217-US-C1)	8617

7590 10/13/2004  
Jennifer Hammond  
The Eclipse Group  
10453 Raintree Lane  
Northridge, CA 91326

EXAMINER

MULL, FRED H

ART UNIT PAPER NUMBER

3662

DATE MAILED: 10/13/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

**Application No.**

10/759,677

**Applicant(s)**

GRONEMEYER, STEVEN A.

**Examiner**

Fred H. Mull

**Art Unit**

3662

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-15 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-15 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_.

## **DETAILED ACTION**

### ***35 USC § 112 6<sup>th</sup> Paragraph***

The following is a quotation of the sixth paragraph of 35 U.S.C. 112:

An element in a claim for a combination may be expressed as a means or step for performing a specified function without the recital of structure, material, or acts in support thereof, and such claim shall be construed to cover the corresponding structure, material, or acts described in the specification and equivalents thereof.

1. Claim(s) 10-12 is/are interpreted by the examiner as invoking 35 USC 112 6<sup>th</sup> paragraph (means plus function). See MPEP § 2181-2186.

### ***Claim Objections***

2. Claims 3, 4, 8, 9, 11, 12, 14, and 15 are objected to because of the following informalities: In the various claims, after --chips-- should be inserted after "512" or "511". Appropriate correction is required.

### ***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Art Unit: 3662

3. Claims 1-4 and 7-15, are rejected under 35 U.S.C. 102(b) as being anticipated by Bloebaum (PCT).

Bloebaum discloses a receiver in receipt of a signal having a plurality of pseudonoise codes with each of the pseudonoise codes of the plurality of pseudonoise codes that originated from a plurality of GPS transmitters p. 5, lines 23-26); a clock with an error of less than 0.5 ms relative to a GPS time (p. 26, lines 5-10); and a decoder connected to the receiver and the clock that identifies four pseudorange equations for at least four GPS transmitters from the plurality of GPS transmitters, and determines a location of the receiver by simultaneously solving the pseudorange equations (p. 16, lines 12-18; p. 29, line 9 to p. 30, line 25).

4. Claims 1-4 and 7-15, are rejected under 35 U.S.C. 102(e) as being anticipated by Bloebaum (US).

Bloebaum discloses a receiver in receipt of a signal having a plurality of pseudonoise codes with each of the pseudonoise codes of the plurality of pseudonoise codes that originated from a plurality of GPS transmitters (column 4, lines 9-14); a clock with an error of less than 0.5 ms relative to a GPS time (column 16, lines 60-67); and a decoder connected to the receiver and the clock that identifies four pseudorange equations for at least four GPS transmitters from the plurality of GPS transmitters, and determines a location of the receiver by simultaneously solving the pseudorange equations (column 11, lines 1-15; column 18, line 55 to column 19, line 55).

***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. Claims 5-6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Bloebaum (PCT).

In regard to claim 5, Bloebaum discloses that synchronization to correct clock error is not necessary for a clock-bias of less than 0.5 ms relative to a GPS time (p. 26, lines 5-10). This allows faster acquisition. However, once the GPS signal is acquired, it would be obvious to correct the clock time error so that during the next iteration (when the position will be needed after a standby time) it is more likely that the clock-bias will be less than 0.5 ms at that time, so that the signal can be fast-acquired again. Otherwise, if the clock-bias is drifting at 0.3 ms an iteration, every other iteration a slow acquisition would be necessary.

In regard to claim 6, temperature compensation of crystal oscillators is well known, and using these types of oscillators in GPS receivers is well known.

6. Claims 5-6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Bloebaum (US).

In regard to claim 5, Bloebaum discloses that synchronization to correct clock error is not necessary for a clock-bias of less than 0.5 ms relative to a GPS time

Art Unit: 3662

(column 16, lines 60-67). This allows faster acquisition. However, once the GPS signal is acquired, it would be obvious to correct the clock time error so that during the next iteration (when the position will be needed after a standby time) it is more likely that the clock-bias will be less than 0.5 ms at that time, so that the signal can be fast-acquired again. Otherwise, if the clock-bias is drifting at 0.3 ms an iteration, every other iteration a slow acquisition would be necessary.

In regard to claim 6, temperature compensation of crystal oscillators is well known, and using these types of oscillators in GPS receivers is well known.

7. The examiner also finds the following reference(s) relevant:

Rodel '453, Rodel '708, Hirata (end of column 4 to beginning of column 5), Brown (5,379,224), Niles (5,420,593), Beason (5,654,718), and Gildea (5,854,605) all disclose temperature compensation of a crystal oscillator in a GPS receiver.

Applicant is encouraged to consider these documents in formulating their response (if one is required) to this action, in order to expedite prosecution of this application.

### ***Conclusion***

8. This is a continuation of applicant's earlier Application No. 10/017,115. All claims are drawn to the same invention claimed in the earlier application and could have been finally rejected on the grounds and art of record in the next Office action if they had been entered in the earlier application. No amendments, nor arguments based on the

Art Unit: 3662

the previous rejection are presented. Accordingly, **THIS ACTION IS MADE FINAL** even though it is a first action in this case. See MPEP § 706.07(b). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no, however, event will the statutory period for reply expire later than **SIX MONTHS** from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Fred H. Mull whose telephone number is 703-305-1250. The examiner can normally be reached on M-F 9:00 - 5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Thomas H Tarcza can be reached on 703-360-4171. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Art Unit: 3662

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Fred H. Mull  
Examiner  
Art Unit 3662

fhm



THOMAS H. TARCZA  
SUPERVISORY PATENT EXAMINER  
TECHNOLOGY CENTER 3600